Gulf of Mexico Hypoxia Management Conference Presentation

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Abstract

On January 24, 1995, eighteen environmental, social justice and fishermen's organizations, represented by the Sierra Club Legal Defense Fund, petitioned EPA and the State of Louisiana to convene an interstate management conference of all the states contributing nonpoint source pollution to the Mississippi River. That conference is seen as the best hope to develop and implement enforceable controls to reduce nonpoint pollution in the Mississippi River and clean up the Dead Zone in the Gulf of Mexico. While refusing to convene a formal interstate management conference, EPA has convened this conference to begin a strategic assessment process in response to the petition.

The Gulf's Dead Zone poses an enormous threat to the biological integrity and productivity of the Gulf of Mexico, and exposes the precarious ecological condition of the entire Mississippi River. The Dead Zone is a wake-up call to EPA and the states to take immediate and concerted action to control nonpoint pollution entering the River and the Gulf. EPA and the states must commit to and develop a long-term, written and enforceable strategy to clean up the Dead Zone. A successful strategy also will stem the devastation of the Mississippi River ecosystem and improve each state's water and environmental quality.

Introduction

I thought it would be useful to give you a brief history of the Petition that prompted EPA and the Gulf of Mexico Program to convene this meeting, and to address some of our expectations for the process that this meeting is starting.

The Impetus for This Conference

The Dead Zone is a 7,000 square mile swath of Gulf of Mexico water so devoid of oxygen that marine life cannot survive. The Dead Zone, which appears in the Gulf in the summer months, has grown substantially in size over the past two years. It now stretches from the mouth of the Mississippi River to the Texas border. The existence of the Dead Zone, and its implications for the health of the entire Gulf region and the Mississippi River watershed, prompted concerned groups to ask the U.S. Environmental Protection Agency (EPA) to take action to clean it up.

On January 24, 1995, 18 environmental, social justice and fishermen's organizations, represented by the Sierra Club Legal Defense Fund, petitioned EPA and the State of Louisiana to convene an interstate management conference of all the states contributing nonpoint source pollution to the Mississippi River. The petitioners were not limited to groups from Louisiana

and Texas—the states suffering the most direct impacts of the Dead Zone—but included groups representing individuals from Minnesota to Louisiana. That call for action has been joined by the Gulf Restoration Network, a coalition of over 30 local, regional and national groups dedicated to protecting and restoring the health of the Gulf of Mexico.

The petition was prompted by scientific research showing that the Gulf's Dead Zone is caused in large part by the nutrient loads entering the Gulf from the Mississippi River. I am sure that many of you are aware of Dr. Rabalais' research on the Dead Zone. While you will be hearing from Dr. Rabalais directly at this meeting, I would like to highlight one very significant conclusion reached by her. At a Gulf of Mexico Program Symposium held in March 1995, Dr. Rabalais stated that the Dead Zone could not be cleaned up without reducing nonpoint pollution entering the Mississippi River, and ultimately the Gulf, from the up-river states.

The beauty of the requested interstate management conference is that it would bring together those very states identified by Dr. Rabalais—all the states within the Mississippi River watershed—that have the *actual authority* to control the nutrient runoff causing the problem. Moreover, those states would come together for just one purpose: to create real in-the-water reductions of nutrient loading into the Mississippi.

EPA refused to convene the interstate management conference. Instead it elected to attempt to address the Dead Zone through the Gulf of Mexico Program, and other programs already addressing nonpoint source pollution. The State of Louisiana also informed the Petitioners that it would like to use mechanisms already in place to address the Dead Zone problem, despite the fact that in June of this year, the Louisiana Legislature passed a resolution calling for our requested interstate management conference. Louisiana officials have said, however, that the State is prepared to request an interstate management conference if those mechanisms prove insufficient to address the problem.

This meeting *begins* EPA's attempts to respond to our petition without utilizing an interstate management conference.

The Dead Zone Is a Wake up Call for Action

The Dead Zone must be seen as a wake up call for immediate action to begin the clean up process. And that alarm must be heeded.

The magnitude of the Dead Zone problem cannot be overstated. When last measured, the Dead Zone covered more than 7,000 square miles—an area larger than the states of Connecticut and Rhode Island combined. Over the past few years, the Dead Zone has more than doubled in size. Indeed, it is now larger than many bodies of water in EPA's watershed protection program.

The Dead Zone poses a serious threat to the biological integrity and productivity of the Gulf of Mexico. Its impact is akin to taking Saran Wrap and placing it over an area the size of Connecticut and Rhode Island, slowly pulling it down and suffocating everything that cannot escape out the sides. While the area appears to undergo recolonization beginning each fall when the Dead Zone dissipates, the long term implications of a yearly die off remain unclear. By causing such devastation, the Dead Zone also poses a very real threat to the economy of the Gulf region. Already, officials at one seafood processing plant that closed down in Louisiana, blamed the closure in part on the Dead Zone. As a result of that one plant closure, Louisiana

lost 176 jobs. Forty six jobs were lost altogether, and 130 others were relocated to Texas.

Because the Dead Zone is caused by excess nutrients entering the Mississippi River, and ultimately the Gulf, it is a manifestation of land use practices throughout the entire Mississippi River watershed. As such, the Dead Zone exposes the precarious ecological condition of that entire watershed, and should raise alarm bells in each watershed state. We are not alone in this analysis. Many biologists with the Upper Mississippi River Conservation Committee believe that a sudden collapse of the Upper Mississippi River System "is likely to occur." Upper Mississippi River Conservation Committee, *Facing the Threat: An Ecosystem Management Strategy for the Upper Mississippi River* (Dec. 1995) at 8. Indeed, the Committee is meeting this week to develop an ecosystem-wide protection strategy.

Efforts to clean up the Dead Zone will of necessity help stem the devastation of the Mississippi River ecosystem. Those efforts will improve the environmental and water quality in all the states in the Mississippi River watershed.

Decisive Action and StrongLeadership Are Needed to Clean upthe Dead Zone

The Petitioners, the Gulf Restoration Network and the Sierra Club Legal Defense Fund fully recognize that cleaning up the Dead Zone will not be an easy task. We also understand the importance of basing policy decisions to control nutrient enrichment on sound science. As such, we applaud the efforts of the Gulf of Mexico Program in convening this meeting. It is an important first step.

However, we would not have filed the Petition requesting an interstate management conference, if the existing science did not already make clear that actions must be taken to clean up the Gulf, and that those actions must begin *now*. While there may be a need to fill in data gaps, that need cannot be used as an open-ended excuse for not taking action. Additional studies will not make the Dead Zone go away. Only appropriate controls will accomplish that task.

Existing scientific knowledge shows that controls to reduce nonpoint pollution entering the Mississippi River must be implemented quickly. It also shows where at least some of those controls should be. Methods for reducing nitrogen loading (the primary culprit in the Dead Zone) are well recognized and have been implemented successfully in many places. Thus, site specific controls could be implemented immediately in areas of direct nitrogen application and runoff. All that is missing is the appropriate leadership and political will.

Additional innovative control measures also have been suggested. These include reestablishing a natural vegetative corridor along the main stem of the Mississippi River. This would help reduce nitrogen (and other) runoff, and would have the added benefit of returning some of the natural processes of this great floodplain river. This also is an action that could be funded by EPA as a best management practice.

If we are to have any hope of succeeding in cleaning up the Dead Zone, some basic ground rules must be in place:

1. The appropriate parties must be at the table to develop—and then implement—viable controls. It is estimated that 80 percent of nutrients are in the Mississippi by the time it passes Cairo, Illinois, and the vast majority of nitrogen entering the system is coming

from the up-River states. Unfortunately, the Gulf of Mexico Program does not have the authority or the mandate to pull those states into the process being started by this meeting. Thus, it will be up to EPA to show strong leadership and bring into the process all the states in the Mississippi River watershed.

2. An aggressive clean up strategy *cannot* wait until all scientific data gaps are filled. We must begin immediately to develop an aggressive timetable for action. It is essential that we quickly develop a written strategy that prescribes specific solutions to be implemented within a set time frame. The strategy also must set a realistic timetable for this process to show concrete results. One such concrete measurement would be a commitment by the up-River states to reduce their proportionate share of nutrient loading in the River.

3. EPA must show strong leadership, and provide a long term commitment of resources if we are to have any hope of seeing real in-the-water improvements in the Gulf.

The Petitioners, the Gulf Restoration Network, and the Sierra Club Legal Defense Fund have that long term commitment to solving the problem before us, and will do everything necessary to ensure that the process I just outlined is implemented, and continues, until the Dead Zone is cleaned up.

Presentation Discussion

Melissa Samet (Sierra Club Legal Defense Fund—San Francisco, CA)

Eugene Buglewicz *(Corps of Engineers—Vicksburg, MS)* asked Melissa Samet to better define the Coalition's expectation of terms "clean up" and "get results."

Melissa Samet responded by saying she had no scientific definition for the term, but suggested the concepts could be based on reducing the size of the Dead Zone to historical proportions. She added that it was imperative to reduce the area as much as possible.

Clive Walker *(Natural Resources Conservation Service—Texas A&M University, Temple, TX)* commented on Melissa Samet's statement that EPA has money to fund the nonpoint source program for the purposes of placing vegetated buffer strips along the specific rivers. He pointed out that in the wake of EPA budget cuts, these funds would need to be diverted from other programs, and asked her which programs she would suggest cutting.

Melissa Samet responded by saying that she had no specific programs in mind, but she would not recommend cutting programs that are showing on-the-ground and in-the-water improvements. She continued by saying that EPA has money for nonpoint source controls. Many states along the river, as well as the entire country, will benefit from solving the nonpoint problem along the Mississippi River.

Phillip Barbour *(Delta Council, Slidell, LA)* asked Ms. Samet to comment on the land use/ landowner's role in the process.

Melissa Samet suggested that private landowners would have to change their practices in order to achieve consistent nonpoint source pollution reduction, and that it was in their own best interests to do so.

Ron Kucera *(Missouri Department of Natural Resources—Jefferson City, MO)* raised two issues.

- The State of Missouri has implemented a self-imposed sales tax for nonpoint source controls through a Soil and Water Conservation program.

- The Sierra Club often supports positions that are counterproductive to solving water resource issues in the Missouri River Basin. For example, the MNI-SOSE Intertribal Water Coalition, Inc., a tribal corporation interested in water marketing, is claiming 20 percent of the Mississippi River flow above Cairo, Illinois, and 40 percent of the Missouri River flow above St. Louis, Missouri. The MNI-SOSE Coalition asserts that they should be able to market those water rights outside of the Missouri River Basin. Since the Department of the Interior is supporting the initiative to achieve the best use of the resources, and since marketing those rights in the upper river areas would not reflect the interests of the Gulf Coast or the State of Missouri, he asked the Sierra Club to discuss potential reduction in available freshwater quantity with him.

Melissa Samet agreed to discuss the issue with him during the conference, but pointed out that the Sierra Club Legal Defense Fund was a separate entity from the Sierra Club.